

15. (New) The method of claim 14 wherein said first state of gel and said second state of gel are substantially the same.

16. (New) The method of claim 14 wherein the first state of gel and second state of gel are between 2,000 and 30,000 cps.

17. (New) The method of claim 14 further comprising the step of aligning the first mold half relative to the core such that when the core is positioned into the first cavity of the first mold half the core is centered in the first mold cavity.

18. (New) The method of claim 17 further comprising the step of vertically positioning the core in the first mold half by stopping vertical movement at a predetermined vertical position so the core is centered in the first mold cavity.

19. (New) The method of claim 18 wherein the step of aligning the first mold half further comprises:

- a) aligning the first mold half with an alignment rail to position the first mold half in a first direction; and
- b) aligning the first mold half with a second member to position the first mold half in a second direction perpendicular to the first direction.

20. (New) The method of claim 14 wherein the step of allowing the first portion of polyurethane to partially cure to a selected state of gel comprises allowing the polyurethane to reside in the first cavity of the first mold half for about 50 to 80 seconds.

21. (New) A method of making a golf ball having a core and using first and second mold members, comprising the steps of:

- a) placing a first portion of polyurethane in a first cavity of the first mold member;
- b) curing the first portion in the first cavity for a selected amount of time to a selected state of gel;

- c) positioning said core within said first cavity to mold said first portion of said polyurethane at said selected state of gel around said core;
- d) placing a second portion of polyurethane in a second cavity of the second mold member;
- e) curing the second portion in said second cavity for substantially said selected amount of time;
- f) mating said first mold member and said second mold member; and
- g) curing the polyurethane in the mated mold members.

22. (New) The method of claim 21 wherein the step of curing the first portion of polyurethane for a selected amount of time is about 50 to 80 seconds.

23. (New) A method of making a golf ball having a core and outer layer and using first and second mold halves, comprising the steps of:

- a) placing a first portion of polyurethane in a first cavity of the first mold half;
- b) allowing said first portion of polyurethane to partially cure to a selected state of gel of between 2,000 and 30,000 cps in said first cavity;
- c) laterally positioning the first mold half relative to the core;
- d) vertically positioning said core within said first cavity to mold said first portion of said polyurethane at said selected state of gel around said core;
- e) placing a second portion of polyurethane in a second cavity of the second mold half at a time subsequent to the placing of said first portion of polyurethane in said first cavity of said first mold half and allowing the second portion of polyurethane to partially cure to between 2,000 and 30,000 cps;
- f) mating said first mold half and said second mold half; and
- g) curing the polyurethane in the mated mold halves.

24. (New) The method of claim 23 wherein the step of laterally positioning the first mold half further comprises:

- a) aligning the first mold half with an alignment rail to position the first mold half in a first direction; and

b) aligning the first mold half with a second member to position the first mold half in a second direction perpendicular to the first direction.

25. (New) A method of making a golf ball having a core and outer cover and using first and second mold halves, comprising the steps of:

- a) mixing a first portion of prepolymer and curative;
- b) placing said first portion of prepolymer and curative in a first cavity of the first mold half;
- c) allowing said first portion of prepolymer and curative to partially cure to a selected state of gel in said first cavity;
- d) positioning said core within said first cavity while said prepolymer and curative is at said selected state of gel;
- e) placing a second portion of prepolymer and curative in a second cavity of the second mold half at a time subsequent to the placing of said first portion of prepolymer and curative in said first cavity of said first mold half;
- f) mating said first mold half against said second mold half when said second portion of said prepolymer and curative in said second cavity of the second mold half is at substantially the same selected state of gel as the first portion was when the core was positioned in said first cavity of said first mold half; and
- g) curing the prepolymer and curative in the mated mold halves.

26. (New) The method of claim 25 further comprising laterally aligning the first mold half relative to the core so the core is centered in the first mold cavity.

27. (New) The method of claim 26 further comprising vertically positioning the core to a predetermined vertical position in the first mold half so the core is centered in the first mold cavity.